Amendments to the Specification:

Please delete the CROSS REFERENCE TO RELATED APPLICATIONS section and replace it with the following replacement section.

~~This application claims the benefit of U.S. Provisional Application Numbers 60/119,571 filed 2/10/1999, now abandoned, and 60/139,172 filed 6/15/99, now abandoned, both of which are hereby incorporated herein by reference in their entirety.~~

Please replace with examiner's amendment to the specification. MF 04/22/05

This Application is a continuation of U.S. Application No. 09/501,708, filed February 10, 2000, which is a continuation-in-part of U.S. Application No. 09/471,669, filed December 24, 1999, which is an application claiming the benefit under 35 USC 119(e) of U.S. Application Nos. 60/139,172, filed June 15, 1999, 60/119,571, filed February 10, 1999, and U.S. Application No. 60/114,408, filed December 31, 1998. This application is also a continuation of U.S. Application No. 09/501,708, filed February 10, 2000, which is an claiming the benefit under 35 USC 119(e) of U.S. Application Nos. 60/139,172, filed June 15, 1999 and 60/119,571, filed February 10, 1999, all of which are incorporated herein by reference for all purposes.

Please replace the paragraph beginning on page 8, line 14 with the following amended paragraph:

See amdt of Sept. 20/04 MF 04/22/05

FIG. 5 shows the full length amino acid sequence of -secretase 1-501 (SEQ ID NO: 2), including the ORF which encodes it (SEQ ID NO: 1), with certain features indicated, such as "active-D" sites indicating the aspartic acid active catalytic sites, a transmembrane region commencing at position 453, as well as leader ("Signal") sequence (residues 1-21; SEQ ID NO: 46) and the putative pro region (residues 22-45; SEQ

corresponding to the active enzyme porti 46-

501 (SEQ ID NO: 43)(nt 135-1503) is at

Please scan.

Thank you.

MF

Amendments to the Specification:

Please replace the paragraph beginning on page 8, line 14, with the following amended paragraph:

FIG. 5 shows the full length amino acid sequence of ~~secretase~~ β-secretase 1-501 (SEQ ID NO: 2), including the ORF which encodes it (SEQ ID NO: 1). ~~(SEQ ID NO: 1), with certain~~ Certain features indicated, such as "active-D" sites indicating the aspartic acid active catalytic sites, a transmembrane region commencing at position ~~453~~ 455, as well as leader ("Signal") sequence (residues 1-21; SEQ ID NO: 46) and the putative pro region (residues 22-45; SEQ ID NO: 47). ~~(residues 22-45; SEQ ID NO: 47)and where the~~ The polynucleotide region corresponding to the active enzyme portion corresponding to amino acids 46-501 (SEQ ID NO: 43)(nt 135-1503) is shown as ~~SEQ ID NO: 44~~ SEQ ID NO: 42 and contains an internal peptide region (SEQ ID NO:56) and a transmembrane region (SEQ ID NO:62).

MF 04/22/05

Please scan.

Thank you.

MF